

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings of claims in the application:

Listing of Claims:

1. (New) A plurality of fluorescence resonance energy transfer (FRET) hybridization probes comprising:

a first oligonucleotide carrying a FRET donor entity and at least one second entity, said second entity being a compound which is capable of quenching fluorescence of said FRET donor entity; and

a second oligonucleotide carrying a FRET acceptor entity but not carrying a FRET donor entity.

2. (New) The plurality of claim 1, wherein the FRET donor entity and the second entity are carried on adjacent nucleotides of the first oligonucleotide.

3. (New) A set of 3 oligonucleotides, comprising a first oligonucleotide and a second oligonucleotide capable of acting as a pair of amplification primers for a template dependent nucleic acid amplification reaction, further characterized in that said first oligonucleotide and a third oligonucleotide are each labeled with one corresponding member of a FRET pair consisting of a FRET donor entity and a FRET acceptor entity,

wherein the oligonucleotide carrying the FRET donor entity is carrying at least one second entity, said second entity being a compound which is capable of quenching fluorescence of said FRET donor entity; and

wherein the oligonucleotide carrying the FRET acceptor entity does not carry a FRET donor entity.

4. (New) The set of claim 3, wherein FRET donor entity and the second entity are carried on adjacent nucleotides of the oligonucleotide carrying the FRET donor entity.

5. (New) A composition comprising a nucleic acid sample and a pair of hybridization probes according to claim 1 or a set of oligonucleotides according to claim 3.
6. (New) A kit comprising a pair of hybridization probes according to claim 1 or a set of oligonucleotides according to claim 3 and at least one other component selected from a group consisting of a nucleic acid amplification primer a template dependent nucleic acid polymerase, at least one deoxynucleoside triphosphate and a buffer for template dependent nucleic acid amplification reaction.
7. (New) A method for qualitative or quantitative detection of a nucleic acid sequence in a nucleic acid sample, comprising hybridizing said nucleic acid sample with a pair of FRET hybridization probes according to claim 1.
8. (New) The method according to claim 7, further comprising amplifying at least a portion of said nucleic acid present in said sample which comprises a target nucleic acid sequence substantially complementary to the sequence of said hybridization probe according to claim 1 amplified by a template dependent nucleic acid amplification reaction.
9. (New) A method for qualitative or quantitative detection of a target nucleic acid sequence in a nucleic acid sample, comprising amplifying the target nucleic acid sequence template dependent nucleic acid amplification using a primer pair according to said first and said second oligonucleotide of claim 3, and hybridization of the amplification product with said third oligonucleotide of claim 3.
10. (New) The method according to claim 9, further comprising monitoring in real time fluorescence emission of either the FRET donor entity or emission of the acceptor entity.
11. (New) The method according to claim 10, further comprising monitoring in real time fluorescence emission of either the FRET donor entity or emission of the acceptor entity.
12. (New) Method according to claim 10, further comprising monitoring fluorescence emission of said FRET donor entity in a first detector channel and fluorescence emission of said FRET

acceptor entity in a second detector channel, and normalizing the fluorescence emission of said FRET acceptor entity by the fluorescence emission of said FRET donor entity.

13. (New) Method according to claim 12, further comprising monitoring fluorescence emission of said FRET donor entity in a first detector channel and fluorescence emission of said FRET acceptor entity in a second detector channel, and normalizing the fluorescence emission of said FRET acceptor entity by the fluorescence emission of said FRET donor entity.
14. (New) A method for the determination of the melting profile of a hybrid comprising of a target nucleic acid and a pair of FRET hybridization probes according to claim 1, comprising measuring fluorescence emission as a function of temperature.
- 15-28. (Canceled)
29. (Currently Amended) A method for the determination of the melting profile of a hybrid consisting of a target nucleic acid amplified according to claim 7 ~~24~~, and said third oligonucleotide of claim 3 ~~47~~, comprising determining the fluorescence emission as a function of temperature.
30. (Currently Amended) A method for the determination of the melting profile of a hybrid consisting of a target nucleic acid amplified according to claim 7 ~~24~~ and said third oligonucleotide of claim 3 ~~48~~, comprising determining the fluorescence emission as a function of temperature.
31. (Currently Amended) The method according to claims 14 ~~28~~ or 29, further comprising monitoring fluorescence emission of the FRET donor entity in a first detector channel and fluorescence emission of the FRET acceptor entity in a second detector channel, and normalizing the fluorescence emission of said FRET acceptor entity by the fluorescence emission of said FRET donor entity.
32. (New) A plurality of fluorescence resonance energy transfer (FRET) hybridization probes comprising:

a first oligonucleotide carrying a FRET donor entity and a nitroindole moiety capable of quenching fluorescence of said FRET donor entity; and

a second oligonucleotide carrying a FRET acceptor entity.

33. (New) The plurality of claim 32, wherein the same nucleotide of said first oligonucleotide carrying the donor fluorescent entity carries the nitroindole moiety.

34. (New) The plurality of claim 32, wherein the FRET donor entity and the second entity are carried on adjacent nucleotides of the first oligonucleotide.

35. (New) A set of 3 oligonucleotides, comprising a first oligonucleotide and a second oligonucleotide capable of acting as a pair of amplification primers for a template dependent nucleic acid amplification reaction, further characterized in that said first oligonucleotide and a third oligonucleotide are each labeled with one corresponding member of a FRET pair consisting of a FRET donor entity and a FRET acceptor entity,

wherein the oligonucleotide carrying the FRET donor entity is carrying a nitroindole moiety capable of quenching fluorescence of said FRET donor entity .

36. (New) The set of claim 35, wherein the same nucleotide of the oligonucleotide carrying the FRET donor entity also carries the nitroindole moiety.

37. (New) The set of claim 35, wherein FRET donor entity and the second entity are carried on adjacent nucleotides of the oligonucleotide carrying the FRET donor entity.

38. (New) A composition comprising a nucleic acid sample and a pair of hybridization probes according to claim 33 or a set of oligonucleotides according to claim 35.

39. (New) A kit comprising a pair of hybridization probes according to claim 33 or a set of oligonucleotides according to claim 35 and at least one other component selected from a group consisting of a nucleic acid amplification primer a template dependent nucleic acid

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polymerase, at least one deoxynucleoside triphosphate and a buffer for template dependent nucleic acid amplification reaction.